152628

MEMORANDUM

DATE: June 10, 1999

TO: Division of Land File

FROM: Richard Johnson, DLPC/FOS

SUBJECT: LPC #0218100005 - Christian County
Pana/South Central Terminal
ILD #084309210
FOS

I conducted a reinspection of the above-mentioned facility on May 11, 1999. Conditions at the site were partly cloudy with a temperature of about 75 °F. The last inspection of South Central Terminal (SCT) was conducted on May 3, 1999 by Mr. Tim Zook, DWPC/FOS, Springfield Region. It was during the May 3, 1999 inspection that Mr. Kevin Turner, On Scene Coordinator with Region V of the United States Environmental Protection Agency, was met at the site. My previous inspection of the site was conducted on April 29, 1999 with Karen Nelson, DLPC/FOS, Springfield Regional Geologist. During the April 29, 1999 inspection samples of Rick and Angie Garber's water well were collected for analysis by the Illinois Environmental Protection Agency's organics laboratory.

During the current inspection we spoke to Ms. Debby Small, receptionist for Richard Bland Construction. Ms. Nelson and I searched and found two piezometers previously installed north of SCT on property occupied by Richard Bland Construction. We also found a private dug well with a decorative stone wall around it located at the south east corner of SCT's office building located just west of Route 51. Possibly the above-mentioned piezometers and well can be sampled at a later time.

Foundry waste from Wagner Castings Company (Wagner) had recently been removed from the site. Areas with super bags of foundry waste west of Tank 113 had been cleaned up along with a large mound of dark foundry waste accumulated in a pile (see photograph 12). Ms. Sherri Grimes of Wagner Casting had previously told me that Wagner will remove all their foundry wastes from South Central Terminal. Remaining at the site were super bags of foundry waste south of Tank 34, and small piles dumped west of Tanks 19 and 119 and west of Building I.

The level of ammonium sulfate material mixed with stormwater in the dike system around Tanks 19, 37, 117, 118, and 119 was about the same as on my last inspection. A foul odor from the dike system was detected during the present inspection. The odor was attributed to the ammonium sulfate material and stormwater (ASM&SW) that leaked and/or spilled into the dike system.

Tank 32 was again found to be dripping ammonium sulfate material from the man-way. A steady stream of the material was coming from the bottom of the man-way. The amount of ammonium sulfate material in Tank 119 was found to be about 10 feet 7.250 inches according to the level gauge. This had changed since the last clear reading of the level gauge which indicated 8 feet and 6.250 inches of material in the

tank.

Included with this report are two site sketches (Site Sketch 1 and Site Sketch 2), and photographs taken during the inspection. The following information pertains to the inspection:

1. A portable pump (Honda Trash Pump WT 40X) set on the road between Tanks 117 and 116 (see photograph 2). A hose ran from the pump into the liquid in the dike system north of Tank 37. The discharge hose ran from the pump toward piping that apparently can transfer the liquid into Tank 116. The liquid inside the dike around Tank 117 appeared almost black but still had a greenish tint. The liquid around Tank 37 and 19 had a reddish-brown color.

2. Going to the south east part of the site, I checked the level of the ASM&SW in the dike system around Tanks 19, 37, 117, 118, and 119 (see photos 1, 8 and 11). There was about 1.5 feet of freeboard at the low portion of the dike south east of Tank 37.

3. The valve at the south east corner of the dike system now has a cable lock (but still no blind flange). A pool of dark liquid surrounded the valve (see photos 3). Given the amount of liquid around the valve, it is speculated that material in the dike system is leaking through or around it. A small pool of the same type of liquid (with an odor and dark tint of ammonium sulfate material) is outside the dike south of Tank 37, just inside the fence line. A continuous pool of water contaminated with ammonium sulfate material went from the south east valve toward the south east corner of the property (see photo 4).

4. From the south east valve location, I proceeded east to a pond of water in the south east corner of the site (see photo 5). It was evident that some of the ammonium sulfate material and storm water had made its way into the pond. The pond water was dark and had a slight sheen on the surface.

5. The pond's eastern bank was again inspected for signs of liquid leaving the site. The repair made in the east bank of the pond was not breached at the time of the inspection but a small pool of the pond water was found east of the fence. Three wet areas east of the pond were observed. Apparently, some of the liquid in the pond soaked through the bank causing the wet areas.

6. A pipe south of the East API Separator was checked. It was located at the base of the dike on the east side of Tank 115. Pooled water was noted at the end of the pipe to the east fence-line. The water was dark and had a faint ammonium sulfate material-odor (see photo 6). This is the first time that there was a visible and odorous indication that water in the culvert has been affected by the ammonium sulfate material. It is speculated that some of the contaminated ditch water near Tank 116 has found a way to this pipe.

7. No flow of water was exiting the East API Separator at the time of the inspection (see photo 7). The water in the separator appeared dark but did not have an odor. Duck weed had started to grow on the surface of the water in the separator.

8. I inspected the south west part of the dike system around Tanks 19, 37, 117, 118, and 119 (see photo 8). The valve in the southwest part of the dike system has both a blind flange and a cable lock on it.

9. A trail of dead and stained vegetation from contact with the ammonium sulfate material and

storm water was observed south of the south west valve (see photo 9). Crossing the site's south fence-line, I continued to track the trail of dead and stained vegetation. Not far past SCT's south fence-line, the trail divides into two. The main flow goes south to a tree line area near the north east corner of Pana's Public Owned Treatment Works (POTW), while a smaller flow goes south west along the north end of the POTW. This main flow of ASM&SW continues south under the POTW's fence-line as observed by dead vegetation, lush green grass, and pools of the liquid (see photo 10). The trail goes along the Pana pistol firing range and then back inside the POTW's fence-line where it eventually leads to a ravine that empties into a creek. The ravine by the creek was moist but there was not flow of ASM&SW that was discernible going into the creek.

10. Tank 32 was reinspected and it was found to be leaking from the man-way (see photo 13). Several pools of leaked ammonium sulfate material were found west and south west of the tank. The site gauge read the same as before (7 feet and one-quarter inch), but the level check for the tank does not work. In order to estimate how much material was leaking from the tank I used a 500 cubic centimeter bottle. It took about 2 minutes to fill the bottle. In an hour that would be about 3.9 gallons of material or about 94 gallons each day.

11. Several roadside ditches at the site were found to be partly filled with water. Water was found in the following ditches: north of Tanks 117 and 118, along the west side of Tanks 111,113 and 116, south and west of Tank 32, and along the east and south sides of the old fire lagoon. Some of the water in the ditches has shown elevated concentrations of ammonia when tested with the Hach ammonia-nitrogen field kit. The ditch water by the north east valve of the dike system around Tanks 19, 37, 117, 118, and 119 was dark and had an odor of ammonium sulfate material. East of the above ditch was another road side ditch in which the water appeared to be affected by the ammonium sulfate material. A small pipe under the road was found to connect the ditch by the north east valve with the ditch on the east side of the road.

12. The West API Separator and its western impoundment were also checked (see photo 14). It should be noted that the channel going into the impoundment has partially been filled in with soil as noted in my last inspection report. Ponded water in the western impoundment had a brown tint.

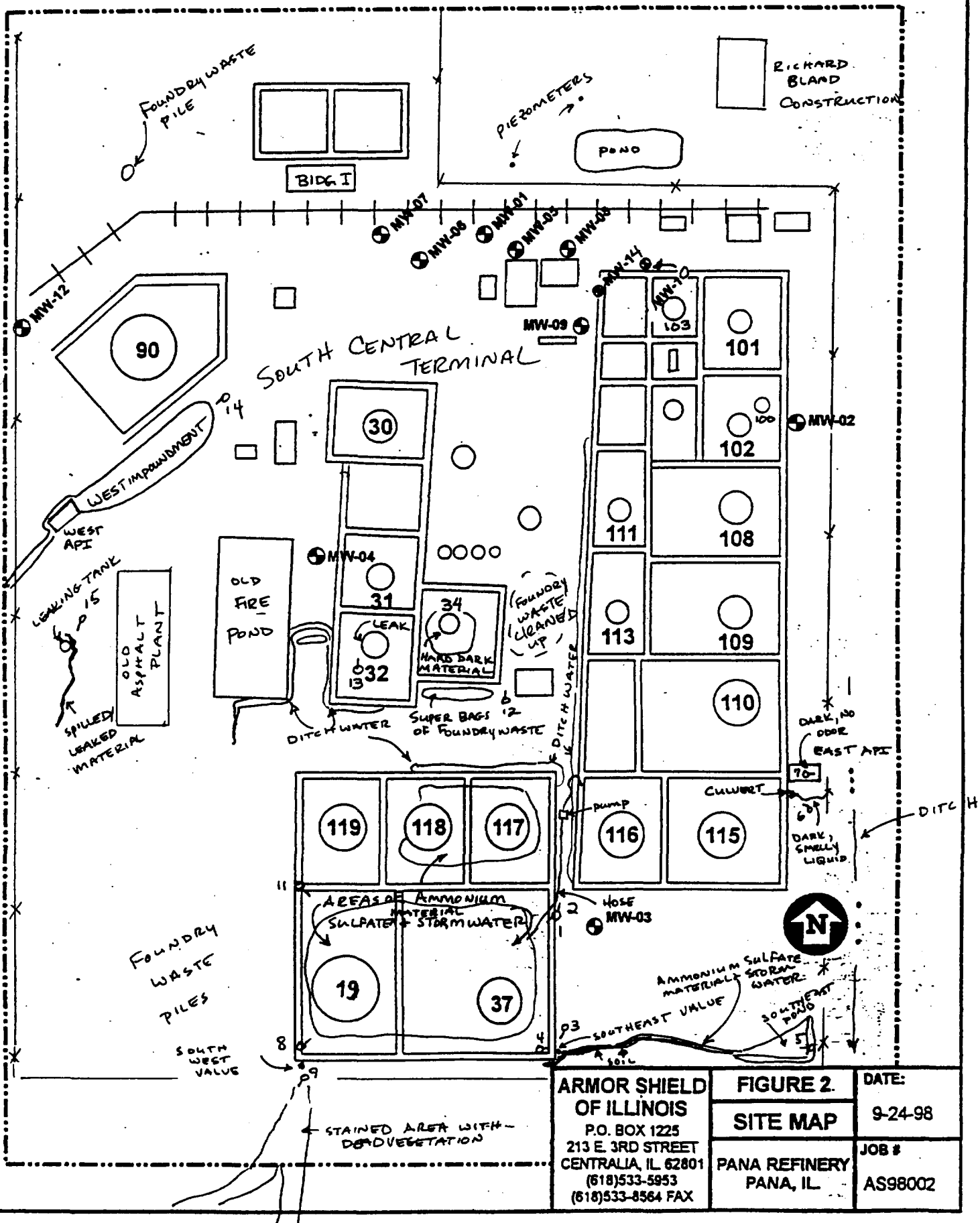
13. Four small tanks are located south of the separator. Three tanks were checked and found to contain a dark petroleum-like material. None of the contents in the tanks matches contaminated water. Mr. Edward's previous assertion that the tanks near the separator hold water removed from the impoundment was not confirmed by my observation.

We left the site at 12:33 p.m.

cc: DWPC/FOS, Springfield Region
DLPC/FOS, Springfield Region
DLPC/FOS, Champaign Region
DLC, Bob Scherschligt
DLC, Greg Richardson
DLC, Chuck Gunnarson
Illinois AG, Desiree Peri
CCSWMD, Joe Stepping

LPC 0218100005 - Christian County
Pana/South Central Terminal

Date: 5-11-99
Time: 10:48AM - 12:33PM



ARMOR SHIELD OF ILLINOIS P.O. BOX 1225 213 E. 3RD STREET CENTRALIA, IL 62801 (618)533-5953 (618)533-8564 FAX	FIGURE 2. SITE MAP	DATE: 9-24-98
	PANA REFINERY PANA, IL	JOB # AS98002

STATE OF ILLINOIS
ENVIRONMENTAL PROTECTION AGENCY

SITE SKETCH

Date of Inspection: 5-11-99 Inspector: Rich Johnson

Site Code: LPC 0218100005 County: Christian

Site Name: Pana/South Central Terminal Time: 10:48Am-12:33PM

Measurements Approximate
Direction of Photo →
Not to Scale

North